SOLUTIA

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Solutia Inc.
575 Maryville Centre Drive
St. Louis, Missouri 63141

PO Box 66760
St Louis Missouri 63166 6760
Tel 314 674 1000

July 7, 2003

Mr. Nabil S. Fayoumi
U. S. EPA - Region 5
77 West Jackson Boulevard (SR-6J)
Chicago, Illinois 60604-3590

Re: Sauget Area 2 Site – October 3, 2002 Unilateral Administrative Order (UAO)
Groundwater Operable Unit
 # 8 - Monthly Report June 1 – June 30, 2003 Reporting Period

Dear Mr. Fayoumi,

Attached is the Monthly Report for the Sauget Area 2 Site October 3, 2002 Unilateral Administrative Order (UAO) - Groundwater Operable Unit. This submittal is in fulfillment of the monthly reporting requirements of the UAO, Section XII, paragraph 62, Progress Reports. This report is for the June 1 – June 30 reporting period.

Sincerely,
Solutia Inc.

Gary Vandiver
Project Coordinator
Solutia Inc.

cc: Bardo, Ken - U. S. EPA
Sandra Bron – IEPA
Mayor Frank Bergman - Cahokia
Village of Sauget – c/o P. H. Weis & Associates (Attn: Brian Nelson)
Mayor P. Sauget - Sauget, IL
Mike Coffey - U. S. Fish & Wildlife Service

Linda Tape – Husch & Eppenberger
Richard Williams – Solutia

Sauget Area 2 Site - Sauget, Illinois

October 3, 2002 UAO – Groundwater Operable Unit

Monthly Report

Date of Report: July 7, 2003
Period Covered: June 1, 2003 - June 30, 2003
Next Report Period: July 1, 2003 - July 31, 2003

Background

A Unilateral Administrative Order (UAO) was issued to a number of Potentially Responsible Parties, including Solutia, by the U. S. EPA on October 3, 2002, requiring installation of a 3,500 foot long, "U"-shaped, fully penetrating barrier wall to be installed between the downgradient boundary of Sauget Area 2 Site R and the Mississippi River. The wall will be placed to abate the release of impacted groundwater to the river. The UAO (U.S. EPA Docket No. V-W-'02-C-716) also requires installation of three partially penetrating groundwater recovery wells to be installed inside the "U"-shaped barrier wall. The recovery wells will be used to control groundwater moving to the wall. Extracted groundwater will be treated and ultimately discharged to the Mississippi River in compliance with all applicable or relevant and appropriate requirements. Groundwater quality, groundwater level, sediment and surface water monitoring will be used to ensure acceptable performance of the interim groundwater remedy. The work required by the UAO is an interim remedy for the Groundwater Operable Unit at the Sauget Area 2 Site. The remedy was specified in a Record of decision issued on September 30, 2002.

The UAO became effective on November 15, 2002. By letter dated November 15, 2002, Solutia informed the U. S. EPA of its intention to comply with the terms of the UAO.

Agency Actions / Communications

- The RD/RA Work Plan submitted on December 19, 2002 was conditionally approved in an e-mail message dated February 4, 2003. The conditional approval contained a number of questions and comments. Responses to these were provided at the same time that responses to comments on the Pre-Final design were submitted (see below).

- Comments were provided by U. S. EPA in an e-mail dated February 20, 2003 on the Pre-Final (95%) Remedial Design submitted on January 31, 2003. Responses to those comments were submitted on March 6, 2003.
- A second round of comments on the Pre-Final (95%) Remedial Design was received from USEPA in an e-mail message dated April 15, 2003. Responses to those comments were submitted on May 6, 2003.
- The groundwater extraction and disposal portion of the Pre-Final (95%) Remedial Design was approved for construction by the Agency in an e-mail message dated May 13, 2003.
- In an e-mail message dated June 19, 2003, U. S. EPA requested the submission of revised versions of the Focused Feasibility Study, the Remedial Design Work Plan, and the Pre-Final (95%) Remedial Design. The revisions were required to allow the use of techniques other than jet grouting for construction of the barrier wall. The revised documents are scheduled to be submitted on July 3, 2003.

Work Performed During the Reporting Period

- Access

  The requirements of Article XVII, Clause 76, of the UAO have been satisfied. U. S. EPA was informed of this fact in an e-mail from Solutia's counsel, Husch and Eppenberger, dated May 15, 2003. An e-mail acknowledgement of this fact was received from the Agency (Mr. Tom Martin) on May 19, 2003.

- Barrier Wall Contractor Procurement

  Based on prequalification documents sent to 11 potential contractors, a short list of four contractors was compiled and these were invited to submit proposals to construct the project. The selected contractors presented their proposals during the week of March 10, 2003. Based on these proposals, it appears that a conventional soil-bentonite slurry wall may offer some advantages over a jet grouted wall. These advantages were discussed with EPA at a meeting on March 24, 2003 and Solutia was requested to prepare a report comparing the advantages and disadvantages of a slurry wall and a jet grouted wall. That report was submitted to the Agencies on April 24, 2003 and review comments were received from them on May 15, 2003. Responses to those comments were submitted to the Agencies on June 12, 2003. The responses were originally due on June 5, 2003, but an extension of up to one week was granted by the Agency at a meeting held on June 4, 2003.

  Bidding documents for the construction of a soil-bentonite barrier wall were sent to three specialist slurry wall contractors (Inquip, Soletanche, and TREVIICOS) on June 27, 2003. Bids are due on July 21, 2003 and the bid evaluation process is expected to be complete by August 1, 2003.

- Groundwater Pilot Test

In order to obtain a representative sample of the extracted groundwater, one of the extraction wells was installed at the site Beginning on May 19, 2003, this well was developed and the extracted groundwater was treated on site and discharged to the P-Chem treatment facility through a temporary pipeline Following well development, a pilot test was conducted to ensure that enough representative groundwater samples were obtained to adequately define the characteristics of the discharge stream from the groundwater extraction system and to validate the aquifer characteristics used in the design of the system Approximately 1,300,000 gallons of groundwater were extracted and treated on site over the period of May 19 to May 24, 2003, prior to discharge to the P-Chem facility Samples collected from the test are currently being analyzed by an approved laboratory A final discharge permit for this water was received from the American Bottoms Regional Wastewater Treatment Facility (ABRWTF) on May 16, 2003

- Groundwater Discharge Permits

  The final discharge permit to allow discharge to ABRWTF of the groundwater extracted by the full scale system has been received from IEPA A draft discharge permit for this flow has also been received from ABRTF and Solutia provided comments on this draft on June 30, 2003 ABRTF have written to Solutia indicating their intention to grant a final permit by July 15, 2003

  ABRTF is also preparing a startup plan that will define the initial flow rate and sequential increments that they will be required to achieve gradient control while allowing an acclimation period for the activated sludge beds at the American Bottoms Plant The acclimation period is required to allow the biomass in the activated sludge to adjust to the groundwater characteristics

  The local limits evaluation carried out by ABRWTF identified potential concerns with 4-chloroaniline and, to a lesser extent, with 2-chloroaniline Based on these concerns, a work plan was submitted to IEPA to perform a toxicity study with the aim of revising the acute and chronic discharge limits for ABRWTF That work plan was approved in January 2003 and the study commenced at that time The study is progressing well and preliminary results were submitted to the IEPA on April 4, 2003 as part of a public comment on the draft ABRWTF NPDES permit The final results of this study are expected by the end of July

- Pipeline Construction

  Work was initiated in April to install the temporary 6 inch diameter discharge pipeline between the existing extraction well and a discharge manhole located immediately east of the levee As part of this work, sections of an existing 30 inch diameter reinforced concrete pipe (RCP) that runs under the flood protection levee have been cleaned out A 20 inch HDPE line was sliplined through the section of 30 inch RCP under the levee This work was completed in mid-May and the temporary discharge pipeline was utilized during the Treatability Pilot Test The pipeline was disassembled during the June reporting period

Bids were solicited from five contractors for the installation of the permanent discharge pipeline. Bids were received from three of the contractors and a contractor was selected on May 16, 2003. Installation work for the permanent discharge pipeline began on May 27, 2003 and is expected to be completed by the middle of July. As part of the work, pressure and leak tests were performed on the pipeline with all tests exceeding the specified criteria.

- Extraction Well Installation
  The middle of the three extraction wells was installed in November 2002 and development of that well was completed in May 2003. Installation of the other two wells began on May 20, 2003 and the wells were completed and development on June 18, 2003. The wells are constructed of 12 inch diameter casing, instead of the 10 inch diameter called for in the design, to allow for higher pumping volumes if the extraction system is started before the barrier wall is constructed. For the same reason, the well screens were placed to bedrock rather than the planned 105 feet.

- Electrical Supply System
  Work on the electrical supply system began on June 3, 2003 and will be completed by the middle of July.

- Instrumentation and Control System
  Work on the instrumentation and control system began on June 3, 2003 and will be completed by the middle of July.

- Monitoring Well & Piezometer Installation
  Bids were solicited from six contractors for the monitoring well and piezometer installation. Bids were received from five of the contractors and a contractor was selected on June 5, 2003. Monitoring well and piezometer installation work began on June 9, 2003 and will be completed by July 11, 2003.

Data Submittal

No data are submitted with this report.

Work scheduled for next reporting period

- Continue working with ABRWTF to expedite issuance of the final discharge permit.
- Complete installation of permanent discharge pipeline. This includes burying the section west of the flood control levee.
- Complete removal of the granular activated carbon columns used in the pilot test.
- Install remaining piezometers identified in the approved extraction system design.

- Prepare revisions to the FFS, the Remedial Design Work Plan, and the Pre-Final (95%) Remedial Design for submission by July 3, 2003.

Problems and Solutions
None

Submittal Schedule Status
See attached UAO schedule

Issues under review
None

Comments
None

Sauget Area 2 Site - Sauget, Illinois

October 3, 2002 UAO – Groundwater Operable Unit

SCHEDULE

Deliverable	Description	Due Date
Effective Date		**15-Nov-02**
Notice of Intent to Comply	On or before effective date	**15-Nov-02**
Designation of Project Coordinator and Contractors	15 days after effective date	**30-Nov-02**
Access	60 days after effective date	**14-Jan-03**
Notice of land ownership to appropriate governmental office	5 days after effective date	**20-Nov-02**
Notice of land ownership recording and indexing to U.S. EPA	15 days after effective date	**30-Nov-02**
RD/RA Workplan	45 days after effective date	**30-Dec-02**
Assurance of ability to complete work	30 days after effective date	**15-Dec-02**
Monthly Reports	To be submitted on or before the 10th date of each month following the effective date of the UAO	**10-Dec-02**
Construction Completion Report	Within 30 days of a successful final inspection	**TBD**

BCC: (via e-mail only)

G. Vandiver – 1S
B. Gilhousen - 3S
B. Yare - 1S
L. Tape – Husch & Eppenberger, LLC
J. Lebold – 1740
M. Peal
S. Wendler - 3S
D. Ridenhower - 1740
A. Faust - 3N
R. Williams – Williams & Associates